



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER OF PATENTS AND TRADEMARKS  
Washington, D.C. 20231  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/488,265	01/20/2000	Lehmann Martin	5808.200-US	4209

25908 7590 03/26/2003

NOVOZYMES NORTH AMERICA, INC.  
500 FIFTH AVENUE  
SUITE 1600  
NEW YORK, NY 10110

EXAMINER

RAMIREZ, DELIA M

ART UNIT

PAPER NUMBER

1652

DATE MAILED: 03/26/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/488,265

Applicant(s)

MARTIN, LEHMANN

Examiner

Delia M. Ramirez

Art Unit

1652

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 21 January 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 15-26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 15-26 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 20 January 2000 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All   b) ☐ Some \*   c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                             | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)         | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ | 6) <input checked="" type="checkbox"/> Other: <i>CRF problem report</i>     |

Art Unit: 1652

## **DETAILED ACTION**

### ***Status of the Application***

Claims 15-26 are pending.

Applicant's amendment of claims 15-26 and the submission of a new Sequence Listing in Paper No. 20, filed on 1/21/2003 is acknowledged.

It is noted that this application fails to comply with the requirements of 37 CFR §§ 1.821-1.825 for the reason(s) set forth on the attached Notice To Comply With Requirements For Patent Applications Containing Nucleotide Sequence And/Or Amino Acid Sequence Disclosures. In particular, the newly submitted disk has been found unreadable. See CRF Problem Report attached. Applicants must comply with the requirements of the sequence rules (37 CFR 1.821-1.825) before the application can be further considered. Applicants are advised not to send the electronic form of the sequence listing to the 20231 zip code address for the USPTO. Instead, it is recommended that the disk containing the sequence listing be hand carried directly to the Examiner at the following location: USPTO, Technology Center 1600, 7<sup>th</sup> Floor, Crystal Mall 1, 1911 South Clark St., Arlington, VA 22202. Please see the CRF Problem Report for other options in regard to submission of the electronic form of the sequence listing.

Rejections and/or objections not reiterated from previous office actions are hereby withdrawn.

### ***Double Patenting***

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed.

Art Unit: 1652

Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b). Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 15-26 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 8 and 38 of copending Application No. 09/343,126. Both applications share a common inventor: Martin Lehmann. An obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but an examined application claim not is patentably distinct from the reference claim(s) because the examined claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985). Although the conflicting claims are not identical, they are not patentably distinct from each other for the following reasons.

Claim 8 of copending application No. 09/343,126 is directed to a dry or liquid formulation comprising a consensus phytase selected from the group consisting of consensus phytase-10-thermo-Q50T-K91A, consensus phytase-10, consensus phytase-1-thermo[8]-Q50T-K91A, wherein the formulation further comprises a stabilizing agent. Claim 38 of copending application No. 09/343,126 is directed to a dry or liquid composition comprising consensus phytase monomers crosslinked with glutaraldehyde or by oxidation with sodium periodate and reaction with adipic acid dihydrazide, wherein the monomers are crosslinked to themselves or to

other phytase monomers. According to the specification of copending application No. 09/343,126, Figure 17 discloses SEQ ID NO: 129, which is that of a consensus phytase 10, Figure 18 discloses SEQ ID NO: 130, which is that of consensus phytase-11, Figure 20 discloses SEQ ID NO: 134, which is that of a consensus phytase-10-thermo[3]-Q50T-K91A, Figure 19 discloses SEQ ID NO: 132, which is that of a consensus phytase-1-thermo[8]-Q50T-K91A. It is evident from the specification that these consensus phytases provide support for the consensus phytase monomers of claim 38.

Claims 15-20 of the instant application are directed to the polypeptides of SEQ ID NO: 26, 27, 31, and 29. According to the specification of the instant application (pages 20-22), Figure 5 (page 20) discloses SEQ ID NO: 26 as consensus phytase-10, Figure 6 (page 21) discloses SEQ ID NO: 27 as consensus phytase-11, Figure 7 (page 21) discloses SEQ ID NO: 29 as consensus phytase-1-thermo[8]-Q50T-K91A, and Figure 8 (page 22) discloses SEQ ID NO: 31 as consensus phytase-10-thermo[3]-Q50T-K91A. It appears that SEQ ID NO: 26, 27, 29 and 31 of the instant application are identical to SEQ ID NO: 129, 130, 132 and 134 of copending application No. 09/343,126, respectively. Therefore, consensus phytase-10, consensus phytase-11, consensus phytase-1-thermo[8]-Q50T-K91A, and consensus phytase-10-thermo[3]-Q50T-K91A are the same in both applications. As such, claims 8 and 38 of copending application No. 09/343,126, which are drawn to a dry or liquid enzyme formulations comprising the polypeptides of SEQ ID NO: 26, 27, 29 or 31 anticipate claims 15-20 of the instant application.

Claims 21-26 of the instant application are drawn to a food or feed composition comprising the polypeptides of SEQ ID NO: 26, 27, 29 or 31. It would have been obvious to

Art Unit: 1652

one of ordinary skill in the art at the time the invention was made to make a food or feed composition comprising consensus phytase-10, consensus phytase-1-thermo[8]-Q50T-K91A, consensus phytase-11, or consensus phytase-10-thermo[3]-Q50T-K91A. A person of ordinary skill in the art is motivated to make such compositions since phytases are enzymes known for the degradation of phytate and the liberation of phosphorous. One of ordinary skill in the art has a reasonable expectation of success at making a food or feed composition comprising consensus phytase-10, consensus phytase-1-thermo[8]-Q50T-K91A, consensus phytase-11, or consensus phytase-10-thermo[3]-Q50T-K91A since phytases are well known additives of food/feed compositions. Therefore, the food/feed compositions of claims 21-26 of the instant application are obvious variations of the enzyme formulations of claims 8 and 38 of copending application No. 09/343,126.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

3. This rejection has been applied to claims 18 and 24 in previous Office Action Paper No. 19, mailed on 7/11/2002.

4. Applicants argue that U.S. Application No. 09/343,126 is owned by F. Hoffmann-La Roche AG and U.S. Application No. 09/488,265 is owned by Novozymes A/S. Applicants assert that since the claims in U.S. Application No. 09/343,126 are directed to stabilized enzyme formulations comprising a phytase and a stabilizing agent, the claims do not conflict with the claims of the instant application. Furthermore, Applicants request that if the rejection is maintain, the Office should provide a copy of U.S. Application No. 09/343,126, including the sequence listing as well as a copy of the pending claims.

Art Unit: 1652

5. Applicant's arguments have been fully considered but are not deemed persuasive to overcome the rejection. See the detailed discussion provided above in regard to the reasons why claims 8 and 38 of U.S. Application No. 09/343,126 are not patentably distinct from claims 15-26 of the instant application. The Examiner acknowledges Applicant's request for a copy of U.S. Application No. 09/343,126, including the sequence listing as well as a copy of the pending claims. It is noted however that this documentation should be available from inventor Martin Lehmann, who is the common inventor in both applications. Furthermore, the Office cannot provide such documentation, particularly in view of the fact that the specification and the sequence listing are extremely long.

### *Conclusion*

6. No claim is in condition for allowance.

7. Applicants are requested to submit a clean copy of the pending claims (including amendments, if any) in future written communications to aid in the examination of this application.

8. Certain papers related to this application may be submitted to Art Unit 1652 by facsimile transmission. The FAX number is (703) 308-4556. The faxing of such papers must conform with the notices published in the Official Gazette, 1156 OG 61 (November 16, 1993) and 1157 OG 94 (December 28, 1993) (see 37 CFR 1.6(d)). NOTE: If Applicant submits a paper by FAX, the original copy should be retained by Applicant or Applicant's representative. NO DUPLICATE COPIES SHOULD BE SUBMITTED, so as to avoid the processing of duplicate papers in the Office.

Art Unit: 1652

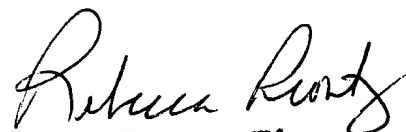
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Delia M. Ramirez whose telephone number is (703) 306-0288.

The examiner can normally be reached on Monday-Friday from 8:30 AM to 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dr. Ponnathapura Achutamurthy can be reached on (703) 308-3804. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0196.

Delia M. Ramirez, Ph.D.  
Patent Examiner  
Art Unit 1652

DR  
March 19, 2003

  
REBECCA E. PROUTY  
PRIMARY EXAMINER  
GROUP 1800  
1600